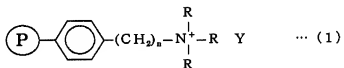


AMENDMENTS TO THE CLAIMS

This listing of claims will replace all prior versions and listings of claims in the application:

LISTING OF CLAIMS:

1. (Currently Amended) A method for producing a radioactive fluorine compound comprising the steps of: introducing [^{18}F] fluoride ion-containing [^{18}O] water into a column packed with an ion exchange resin to collect [^{18}F] fluoride ions; and causing a substrate to react with the collected [^{18}F] fluoride ions, characterized in that the ion exchange resin is represented by the following general formula (1):



wherein n ~~represents an integer from 1 to 10~~; R ~~represents is~~ a linear butyl group or branched monovalent hydrocarbon group having 1 to 8 carbon atoms; P ~~represents is~~ a polystyrene-divinylbenzene styrene-copolymer; and Y ~~represents an anion is~~ CO_3^{2-} or HCO_3^- .

2. (Cancelled).
3. (Original) The method for producing a radioactive fluorine compound according to Claim 1, wherein the [^{18}F] fluoride ion-containing [^{18}O] water is introduced into the column in an amount of 1 g to 20 g.